

PA13-SERIES PACKAGED AIR CONDITIONERS

Cooling Capacities: 23,000 to 56,500

SEER: 13.0

GREEN REFRIGERANT R-410A





BACK (OUTDOOR AIRFLOW) END OF UNIT

Standard Engineered Features

Air Conditioner Compressor:

Reciprocating compressors with crankcase heaters are standard on 2, 21/2 and 3-ton models. Scroll compressors are used on all other models and no crankcase heaters are required.

R-410A Refrigerant:

Designed with R-410A (HFC) nonozone depleting refrigerant in compliance with the Montreal protocol and 2010 EPA requirements.

ECM Indoor Blower Motor:

Features an electronically commutated motor providing super-high efficiency, low sound levels and soft-start capabilities. The motor is selfadjusting to provide the proper airflow rate for a broad range of static pressure in ducted installations without user adjustment or wiring changes.

Aluminum Finned Copper Coils:

Grooved tubing and enhanced louvered fin for maximum heat transfer and energy efficiency.

Outdoor coil is constructed with special corrosion resistant hydrophilic fin stock with 2-layer coating. (1st layer - blue acrylic primer; 2nd layer - clear topcoat.)

Thermal Expansion Valves:

Models with reciprocating compressors have bleed TXV, models with scroll compressor have non-bleed TXV.

Discharge Muffler:

Standard on 21/2 and 3-ton models.

Liquid Line Filter Drier:

Protects system against moisture.

Compressor Control Module:

Built-in off-delay timer adjustable from 30 seconds to 5 minutes. 2-minute on-delay if power interrupt. 120second bypass for low pressure control, and both soft and manual lockouts for high and low pressure controls. Alarm output for alarm relay.

Phase Rotation Monitor:

Standard on all 3-phase models. Protects against reverse rotation if power supply is not properly connected.

High & Low Pressure Switches are Auto-Reset

Built-in lockout circuit resets from the room thermostat. Provides commercial quality protection to the compressor.

Pre-Painted 20 Gauge Zinc Coated Steel Cabinet:

Cleaned, rinsed, sealed and dried before the polyurethane primer is applied. The cabinet is handsomely finished with a baked on textured enamel, which allows it to withstand 1000 hours of salt spray tests per ASTM B117-03.

Pre-Painted 16 Gauge Zinc Coated Unit Base:

The unit base is treated with the same paint coatings as the cabinet above, insuring years of service.

Top Discharge Outdoor Fan:

Efficiently moves air quietly for effective heat exchange.

Electrical Components & Controls:

Readily accessible for easier service.

Field Installed Accessories

Optional Field Installed Electric Heat

With automatic limit and thermal cutoff.

- Field installed heater package for all models
- · Features slide-in field assembly with various BTUH outputs.
- · Permits stocking of only one unit.

Optional Field Installed Low Ambient Control:

Cycles outdoor fan motor below 55°F outdoor temperature to maintain acceptable condensing pressure.







1 of 8

Cooling Capacities	and Efficien	cy Ratings						
MODELS	Phase	втин	SEER					
PA13242-A	1	23,000	13.00					
PA13302-A 1 29,000 13.00								
PA13362-A, -B	1 and 3	34,000	13.00					
PA13422-A, -B, -C	1 and 3	43,000	13.50					
PA13482-A, -B, -C	PA13482-A, -B, -C 1 and 3 46,500 13.00							
PA13602-A, -B, -C 1 and 3 56,500 13.00								

Tested and Certified in accordance with ARI Standard 210/240-2003.

General Sp	ecifica	tions											
Model	PA13242-A	PA13302-A	PA13362-A	PA13362-B	PA13422-A	PA13422-B	PA13422-C	PA13482-A	PA13482-B	PA13482-C	PA13602-A	PA13602-B	PA13602-0
Electric Rating – 60 Hz – Circuit A	230/208-60-1	230/208-60-1	230/208-60-1	230/208-60-3	230/208-60-1	230/208-60-3	460-60-3	230/208-60-1	230/208-60-3	460-60-3	230/208-60-1	230/208-60-3	460-60-3
Operating Voltage Range	197 - 253	197 - 253	197 - 253	187 - 253	197 - 253	187 - 253	414 -506	197 - 253	187 - 253	414 -506	197 - 253	187 - 253	414 -506
Minimum Circuit Ampacity ®	15	18	24	16	33	23	12	33	29	14	39	26	17
BCSC	9	11	15	10	21	15	8	22	14	8	26	16	9
Field Wire Size ③	12	10	8	12	10	10	14	8	10	12	8	10	10
Ground Wire Size	12	10	8	12	10	10	14	8	10	14	8	10	12
Delay Fuse - Max. ②	20	25	35	20	50	35	15	50	40	20	60	40	25
Total unit Amps – 230/208	10.8/11.8	13.3/14.8	16.4/18.4	17.0/13.3	16.2/18.1	14.1/15.4	10.4	23.0/24.7	16.9/18.0	10.7	25.3/28.9	17.7/19.9	11.9
Compressor - Circuit A		-		-	-		-	-	-	-	-	-	-
Compressor Type	Recip.	Recip.	Recip.	Recip.	Scroll	Scroll	Scroll	Scroll	Scroll	Scroll	Scroll	Scroll	Scroll
Volts	230/208	230/208	230/208	230/208	230/208	230/208	460	230/208	230/208	460	230/208	230/208	460
Rated Load Amps	7.5/8.5	9.5/11	12/14	7.6/8.9	11.8/13.7	8.3/9.6	7.7	17/18.7	10.9/12	7.7	19.3/22.9	11.7/13.9	8.6
Lock Rotor Amps	48/48	57/57	74/74	75/75	115/115	115/115	50	117/117	83.1/83.1	50	134/134	110/110	52
Fan Motor and Condenser													
Fan Motor – HP	1/6 - 825	1/6 - 825	1/6 - 825	1/6 - 825	1/4 - 825	1/4 - 825	1/4 - 825	1/4 - 825	1/4 - 825	1/4 - 825	1/4 - 825	1/4 - 825	1/4 - 825
Fan Motor Amps	1.1	1.1	1.1	1.1	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Fan - Dia./CFM	24"/2700	24"/2600	24"/2600	24"/2600	24"/3400	24"/3400	24"/3400	24"/3400	24"/3400	24"/3400	24"/3400	24"/3400	24"/3400
Motor and Evaporator			-			-			-	-			-
Blower Motor – HP ①	1/3 - ECM	1/2 - ECM	3/4 - ECM	3/4 - ECM	3/4 - ECM	3/4 - ECM	3/4 - ECM	3/4 - ECM					
Blower Motor – Amps	2.2	2.7	3.3	3.3	3.9	3.9	3.9	4.5	4.5	4.5	5.0	5.0	5.0
Charge (R-410 oz.)	75	85	120	120	160	160	160	160	160	160	160	160	160
Shipping Weight (pounds)	360	410	410	410	440	440	490	440	440	490	450	450	500

- ① ECM = Electronically Commutated Motor
- ② Maximum time delay fuse or HACR type circuit breaker for protection of field wiring devices.
- ③ Based on 75°C copper wire. All wiring must conform to the National Electrical Code and all local codes.
- These "Minimum Circuit Ampacity" values are to be used for sizing the field power conductors. Refer to National Electric Code (latest revision), Article 310 for power conductor sizing.

Indoor B	lower Peri	formance	①		
MODEL	Rated ESP	MAX ESP	② Continuous Airflow	③ Rated Cooling CFM	Rated Electric Heat CFM
PA1324	0.10	0.50	600	800	1000
PA1330	0.15	0.50	750	1000	1000
PA1336	0.15	0.50	825	1100	1100
PA1342	0.20	0.50	925	1400	1400
PA1348	0.20	0.50	1025	1550	1750
PA1360	0.20	0.50	1150	1750	1750

- ① Motor will deliver consistent CFM through voltage supply range with no deterioration (197-253V for all 230/208V models).
- © Continuous CFM is the total air being circulated during continuous (manual fan) mode.

 © Will occur automatically with a call for "Y" for cooling mode operation.

 © Will occur automatically with a call for "W1" for heating mode operation.

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Optional Field Installed Electric Heater Packages

Optional field-installed electric heater packages are available for 5 through 15Kw capacities. The heater packages are UL listed to be field-installed into the basic unit. They feature prewired control circuit wiring with plug-in connector. Simply slide the heater into the unit, plug in the pretested control circuit and connect the separate high voltage circuit wiring.

IMPORTANT: While this electrical data is presented as a guide, it is important to electrically connect properly sized fuses and conductor wires in accordance with the National Electrical Code and all existing local codes.



Optional Field Installed Heater Packages Are Only To Be Used With The Models As Indicated Below

Heater Package Model	Volts & Phase	PA13242-A	PA13302-A	PA13362-A	PA13362-B	PA13422-A	PA13422-B	PA13422-C	PA13482-A	PA13482-B	PA13482-C	PA13602-A	PA13602-B	PA13602-C
EHP323-A05	240/208-1	х	х	х										
EHP323-A10	240/208-1	Х	х	х										
EHP323-A15	240/208-1		х	х										
EHP323-B09	240/208-3				Х									
EHP323-B15	240/208-3				Х									
EHP513-A05	240/208-1					х			Х			х		
EHP513-A10	240/208-1					Х			Х			Х		
EHP513-A15	240/208-1					Х			Х			Х		
EHP513-B09	240/208-3						Х			Х			Х	
EHP513-B15	240/208-3						Х			Х			Х	
EHP513-C09	460-3							Х			Х			Х
EHP513-C15	460-3							х			Х			х

Optional Field Installed Electric Heater Table — 2 through 5 Ton

Heater	Unit		& Capacity /olts (480)		& Capacity 8 Volts	240/208V	10/208V Heater		Circuit B						
Package Model No.	Volts Phases	KW	втин	KW	втин	Htr. Amps (480)	Internal Circuit Breaker	No. Field Circuits	③ Min. Circuit Ampacity	① Max. Over Current Protection	© Field Power Wiring	② Ground Wire Size			
EHP323-A05	240/208-1	5	17,100	3.75	12,800	20.8/18.1		1	26/23	30/25	10/10	10			
EHP323-A10	240/208-1	10	34,100	7.50	26,000	41.6/36.2	30/60	1	53/46	60/50	6/8	10			
EHP323-A15	240/208-1	15	51,200	11.25	38,400	62.5/54.1		1	79/68	80/70	4/4	8			
EHP513-A05	240/208-1	5	17,100	3.75	12,800	20.8/18.1		1	26/23	30/25	10/10	10			
EHP513-A10	240/208-1	10	34,100	7.50	26,000	41.6/36.2	30/60	1	53/46	60/50	6/8	10			
EHP513-A15	240/208-1	15	51,200	11.25	38,400	62.5/54.1		1	79/68	80/70	4/4	8			
EHP323-B09	240/208-3	9	30,700	6.75	23,000	21.7/18.7	None	1	28/24	30/25	10/10	10			
EHP323-B15	240/208-3	15	51,200	11.25	38,400	36.2/31.2	None	1	46/39	50/40	8/8	10			
EHP513-B09	240/208-3	9	30,700	6.75	23,000	21.7/18.7	None	1	28/24	30/25	10/10	10			
EHP513-B15	240/208-3	15	51,200	11.25	38,400	36.2/31.2	None	1	46/39	50/40	8/8	10			
EHP513-C09	480-3	9	30,700			10.8	None	1	14	15	14	14			
EHP513-C15	480-3	15	51,200			18	INOTIC	1	28	30	10	12			

Maximum size of the time delay fuse or HACR circuit breaker for protection of field wiring devices.

IMPORTANT: While this electrical data is presented as a guide, it is important to electrically connect properly sized fuses and conductor wires in accordance with the National Electrical Code and all existing local codes.

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② Based on wire suitable for 75°C. Other wiring materials must be rated for marked "Minimum Circuit Ampacity" or greater. Based on 75°C copper wire. All wiring must conform to the National Electric Code and all local codes.

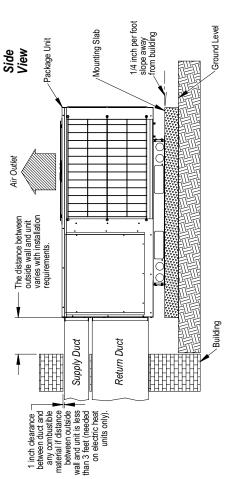
These "Minimum Circuit Ampacity" values are to be used for sizing the field power conductors. Refer to the National Electric Code (latest revision), Article 310 for power conductor sizing.

Cooling Application Data — Outdoor Temperature ①

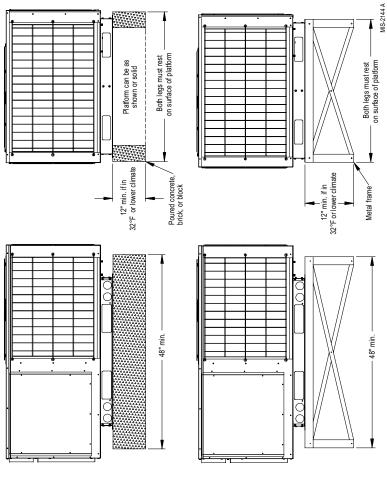
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Model	D B W B ©	Cooling	קא. ד∘ ה	∃°US	A5°E	3002	75∘⊑	π ₀ Og	85°F	30°E	95°F	100∘⊞	105°E	110∘E	115°₽	120°E
	75/62	Total Cooling Sensible Cooling	30,100	29,000	27,900	26,750	25,650	24,550	23,500	22,400	21,300	20,100	18,850	17,650	16,450	15,200
PA1324	29/08	Total Cooling Sensible Cooling	31,900	30,750	29,650 19,800	28,500	27,400 18,800	26,300 18,300	25,200 17,750	24,100 17,250	23,000	21,800	20,600	19,400	18,200 15,350	17,000
	85/72	Total Cooling Sensible Cooling	35,600 20,900	34,350 20,450	33,150 19,950	31,950 19,500	30,750 19,000	29,600 18,500	28,450 18,000	27,300 17,500	26,150 16,950	24,650 16,600	23,200 16,300	21,750 15,950	20,250	18,800 15,250
	75/62	Total Cooling Sensible Cooling	38,150 27,050	36,700 26,450	35,300 25,850	33,900 25,250	32,500 24,600	31,100 24,050	29,700 23,450	28,300 22,900	26,850 22,300	25,450 21,600	24,000 20,850	22,550 20,150	21,100	19,700 18,700
PA1330	29/08	Total Cooling Sensible Cooling	40,400	38,950 26,650	37,550 25,950	36,100 25,300	34,700	33,300 23,900	31,850 23,200	30,450 22,500	29,000	27,600 21,200	26,200 20,650	24,800 20,050	23,400	22,000 18,900
	85/72	Total Cooling Sensible Cooling	45,050 27,500	43,550 26,850	42,000 26,200	40,450 25,550	38,900 24,850	37,400 24,200	35,950 23,500	34,450 22,800	32,950 22,150	31,200 21,550	29,500 20,950	27,750 20,400	26,050 19,800	24,300 19,200
	75/62	Total Cooling Sensible Cooling	43,200 48,150	41,700 45,450	40,200 42,800	38,700 40,100	37,150 37,450	35,750 34,350	34,350 31,250	32,900 28,150	31,500 25,050	29,600 24,050	27,750 23,000	25,850 21,950	23,950 20,900	22,100 19,850
PA1336	29/08	Total Cooling Sensible Cooling	45,750 48,400	44,250 45,650	42,700 42,900	41,200	39,700 37,400	38,300 34,200	36,850 30,950	35,450 27,750	34,000 24,500	32,150 23,600	30,300 22,750	28,400 21,850	26,550 21,000	24,700
	85/72	Total Cooling Sensible Cooling	51,050 48,850	49,400 46,100	47,800 43,350	46,150 40,550	44,500 37,800	43,050 34,600	41,550 31,350	40,100 28,100	38,600 24,900	36,350 24,000	34,100 23,100	31,850 22,200	29,550 21,300	27,300 20,400
	75/62	Total Cooling Sensible Cooling	54,250 39,500	52,450 38,700	50,650 37,950	48,900 37,150	47,100 36,400	45,300 35,650	43,450 34,950	41,650 34,250	39,850 33,550	38,150 32,500	36,450 31,400	34,750 30,300	33,100 29,250	31,400 28,150
PA1342	29/08	Total Cooling Sensible Cooling	57,400 39,900	55,650 39,000	53,850 38,100	52,100 37,250	50,300 36,350	48,500 35,450	46,650 34,600	44,850 33,700	43,000 32,800	41,400	39,850 31,100	38,250 30,200	36,700 29,350	35,100 28,500
	85/72	Total Cooling Sensible Cooling	64,050 40,200	62,150 39,350	60,250 38,450	58,300 37,600	56,400 36,750	54,500 35,900	52,650 35,050	50,750 34,150	48,850 33,300	46,850 32,450	44,850 31,550	42,850 30,700	40,800	38,800 28,950
	75/62	Total Cooling Sensible Cooling	57,550 42,200	55,700 41,300	53,900 40,400	52,050 39,500	50,250 38,600	48,452 37,700	46,650 36,850	44,850 35,950	43,100 35,100	41,100 34,050	39,100 33,050	37,150 32,000	35,150 30,950	33,200 29,950
PA1348	29/08	Total Cooling Sensible Cooling	60,850 42,600	59,050 41,600	57,250 40,550	55,450 39,550	53,650 38,550	51,850 37,500	50,100 36,450	48,300 35,350	46,500 34,300	44,600 33,500	42,750 32,700	40,850 31,900	39,000 31,100	37,100 30,300
	85/72	Total Cooling Sensible Cooling	67,900 42,950	66,000 41,950	64,050 40,950	62,100 39,950	60,150 38,950	58,350 37,950	56,500 36,900	54,650 35,850	52,800 34,850	50,450 34,026	48,100 33,200	45,750 32,400	43,400	41,000
	75/62	Total Cooling Sensible Cooling	66,400 46,950	64,550 46,250	62,700 45,550	60,900 44,850	59,050 44,200	57,350 43,850	55,700 43,550	54,000 43,250	52,350 42,900	49,800 40,750	47,300 38,550	44,750 36,350	42,250 34,200	39,700 32,000
PA1360	29/08	Total Cooling Sensible Cooling	70,250 47,450	68,450 46,600	66,650 45,800	64,850 44,950	63,050 44,150	61,400 43,600	59,800 43,050	58,150 42,500	56,500 41,950	54,100 40,050	51,650 38,150	49,250 36,200	46,800 34,300	44,400 32,400
	85/72	Total Cooling Sensible Cooling	78,350 47,800	76,450 47,000	74,500 46,200	72,600 45,450	70,700 44,650	69,050 44,100	67,450 43,600	65,800 43,100	64,200 42,600	61,200 40,650	58,150 38,700	55,150 36,800	52,100 34,850	49,100 32,900

Below 55°F, unit requires a field installed low ambient control model CMA-28.
 Return air temperature °F.

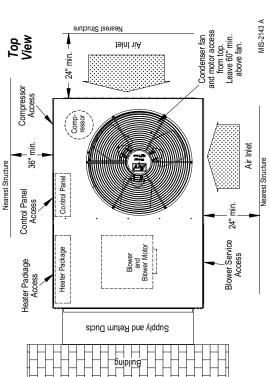
Slab Mounting at Ground Level

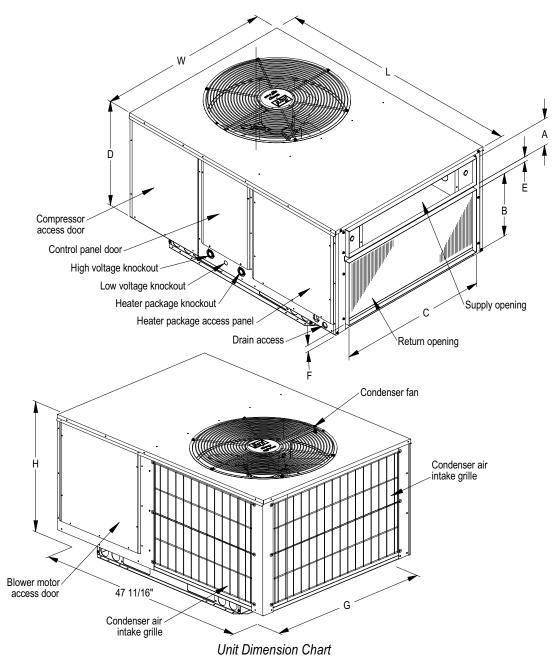


Elevated Mounting Platforms (Field Constructed)



Airflow & Service Access Clearances





Return Size Unit Overall Dimensions Supply Size Unit General Dimensions Unit W (width) H (height) L (length) PA/PH1324,1330,1336 5.875 32.875 13.875 32.875 38.125 23.25 1.375 35.625 26.25 53.25 PA/PH1342,1348,1360 9.875 37.875 15.875 42.375 38.125

MIS-2142 A

Optional Control M	lodules — Field Ins	talled
Field Installed Part	Applicable To	Description
CMA-28	All Models	Low Ambient Control
CMC-15	All -A Models	Compressor Start Kit

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Optional Equipment — Roof Hood

- · Shipped knocked down
- · Polyester baked enamel galvanneal cabinet
- Heavy insulation 1/2 inch

- Built-in filter
- Fresh air damper assembly provides up to 15% outside air.
- Requires prefabricated roof curb 9042-003 or 9042-004.
 Order separately.

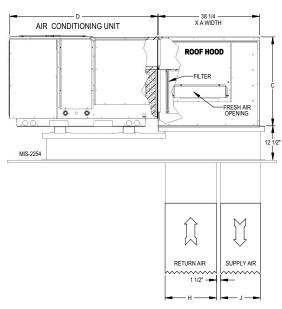
Model No.	Applicable To	Shipping Weight
RHP313-A	2, 2-1/2 and 3 ton models	110
RHP513-A	3-1/2, 4 and 5 ton models	120

[†] Equivalent units - Shipping

Performance and Application Data — RHP

RHP313-A Ventilation Air

Supply Air Static				Ve	ntilati	ion Ai	r (CF	M)			
0.00	N/A	N/A	133	183	226	260	283	290	304	320	370
0.20	N/A	N/A	133	183	226	260	283	290	304	N/A	N/A
0.40	N/A	N/A	133	183	2.26	260	283	290	N/A	N/A	N/A
Return Static	0.00	0.05	0.10	0.15	0.20	0.25	0.30	0.35	0.40	0.45	0.50



RHP513-A BFAD Ventilation Air

Supply Air Static				Ve	entilat	ion A	r (CFI	M)			
0.00	N/A	N/A	80	165	215	250	280	310	340	370	400
0.20	N/A	N/A N/A 80 165 215 250 280 310 340 370 400									
0.40	N/A	N/A	80	165	215	250	280	310	340	370	400
Return Static	0.00	0.05	0.10	0.15	0.20	0.25	0.30	0.35	0.40	0.45	0.50

Unit Dimensions

Roof Hood Model	Model	Nominal Tonnage	Α	С	D	1" Filter
	PA1324 / PH1324	2 Ton				(1) 16 x 16
RHP313-A	PA1330 / PH1330	2½ Ton	38-1/8	26	53-1/4	and
	PA1336 / PH1336	3 Ton				(1) 16 x 20
	PA1342 / PH1342	3½ Ton				
RHP513-A	PA1348 / PH1348	4 Ton	42	33	55-1/4	(2) 16 x 20
	PA1360 / PH1360	5 Ton				

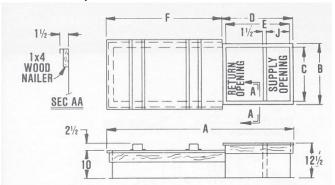
Optional Equipment — Pre-Fabricated Roof Curb

- · Heavy gauge galvanized with wood nailing strip.
- Prefabricated roof curb requires roof hood RHP313-A & RHP513-A.
 Order separately.

Model No.	Applicable To	E.U.†	Shipping Weight
9042-003	2, 2-1/2 and 3 ton models	.80	144
9042-004	3-1/2, 4 and 5 ton models	.80	160

[†] Equivalent units - Shipping

Heavy gauge galvanized with wood nailing strip, welded/leakproof one piece construction - ready to install.



Model	Used With Roof Hood Model	А	В	C ①	D	E	F	J ①	H ①	Heat Pump and Air Conditioning Units
9042-003 (P36 Curb)	RHP313-A	80-3/8	40-1/4	37-1/4	38-3/8	35-3/8	42	14-3/4	19-1/8	All 2, 2-1/2, & 3 Ton Models
9042-004 (P60 Curb)	RHP513-A	82-3/8	44-1/8	41-1/8	38-3/8	35-3/8	44	14-3/4	19-1/8	All 3-1/2, 4 & 5 Ton Models

① Duct Sizing Information:

Return air dimension "C" is length / Supply air dimension "C" is length. Return air dimension "H" is width / Supply air dimension "J" is width.

Optional Equipment — Energy Recovery Ventilator

- Assures continuous supply of fresh air and reduction of all indoor air pollutants. IAQ ASHRAE 62.1
- Provides 250 to 400 CFM (adjustable) of outside air and exhaust. Efficiencies up to 77% heating and 65% cooling.
- Designed for easy installation on roof hoods RHP313-A and RHP513-A.

Model No.	Shipping Weight
ERVR-A3D-X (230/208V)	125 lbs.
ERVR-C3D-X (460)	125 lbs.

PERFORMANCE AND APPLICATION DATA - ERVR-A3C

										ooling Pe									
	bient .D.		VENTIL	ATION F	RATE - 40 ficiency	00 CFM			VENTILATION RATE - 325 CFM 64% Efficiency						VENTILATION RATE - 250 CFM 65% Efficiency				
DΒΛ	VB°F	VLT	VLS	VLL	HRT	HRS	HRL	VLT	VLS	VLL	HRT	HRS	HRL	VLT	VLS	VLL	HRT	HRS	HRL
	75	19,080	12,960	6,120	12,020	8,164	3,855	15,502	10,530	4,972	9,921	6,739	3,182	11,925	8,100	3,825	7,751	5,265	2,486
105	70	12,960	12,960	0	8,164	8,164	0	10,530	10,530	0	6,739	6,739	0	8,100	8,100	0	5,265	5,265	0
	65	12,960	12,960	0	8,164	8,164	0	10,530	10,530	0	6,739	6,739	0	8,100	8,100	0	5,265	5,265	0
	80	28,080	10,800	17,280	17,690	6,804	10,886	22,815	8,775	14,040	14,601	5,616	8,985	17,550	6,750	10,800	11,407	4,387	7,019
	75	19,080	10,800	8,280	12,020	6,804	5,216	15,502	8,775	6,727	9,921	5,616	4,305	11,925	6,750	5,175	7,751	4,387	3,363
100	70	10,980	10,800	180	6,917	6,804	113	8,921	8,775	146	5,709	5,616	93	6,862	6,750	112	4,460	4,387	73
	65	10,800	10,800	0	6,804	6,804	0	8,775	8,775	0	5,616	5,616	0	6,750	6,750	0	4,387	4,387	0
	60	10,800	10,800	0	6,804	6,804	0	8,775	8,775	0	5,616	5,616	0	6,750	6,750	0	4,387	4,387	0
	80	28,080	8,640	19,440	17,690	5,443	12,247	22,815	7,020	15,795	14,601	4,492	10,108	17,550	5,400	12,150	11,407	3,510	7,897
	75	19,080	8,640	10,440	12,020	5,443	6,577	15,502	7,020	8,482	9,921	4,492	5,428	11,925	5,400	6,525	7,751	3,510	4,241
95	70	10,980	8,640	2,340	6,917	5,443	1,474	8,921	7,020	1,901	5,709	4,492	1,216	6,862	5,400	1,462	4,460	3,510	950
	65	8,640	8,640	0	5,443	5,443	0	7,020	7,020	0	4,492	4,492	0	5,400	5,400	0	3,510	3,510	0
	60	8,640	8,640	0	5,443	5,443	0	7,020	7,020	0	4,492	4,492	0	5,400	5,400	0	3,510	3,510	0
	80	28,080	6,480	21,600	17,690	4,082	13,608	22,815	5,265	17,550	14,601	3,369	11,232	17,550	4,050	13,500	11,407	2,632	8,774
	75	19,080	6,480	12,600	12,020	4,082	7,938	15,502	5,265	10,237	9,921	3,369	6,552	11,925	4,050	7,875	7,751	2,632	5,118
90	70	10,980	6,480	4,500	6,917	4,082	2,835	8,921	5,265	3,656	5,709	3,369	2,340	6,862	4,050	2,812	4,460	2,632	1,828
	65	6,480	6,480	0	4,082	4,082	0	5,265	5,265	0	3,369	3,369	0	4,050	4,050	0	2,632	2,632	0
	60	6,480	6,480	0	4,082	4,082	0	5,265	5,265	0	3,369	3,369	0	4,050	4,050	0	2,632	2,632	0
	80	28,080	4,320	23,760	17,690	2,721	14,968	22,815	3,510	19,305	14,601	2,246	12,355	17,550	2,700	14,850	11,407	1,755	9,652
	75	19,080	4,320	14,760	12,020	2,721	9,298	15,502	3,510	11,992	9,921	2,246	7,675	11,925	2,700	9,225	7,751	1,755	5,996
85	70	10,980	4,320	6,660	6,917	2,721	4,195	8,921	3,510	5,411	5,709	2,246	3,463	6,862	2,700	4,162	4,460	1,755	2,705
	65	4,320	4,320	0	2,721	2,721	0	3,510	3,510	0	2,246	2,246	0	2,700	2,700	0	1,755	1,755	0
	60	4,320	4,320	0	2,721	2,721	0	3,510	3,510	0	2,246	2,246	0	2,700	2,700	0	1,755	1,755	0
	75	19,080	2,160	16,920	12,020	1,360	10,659	15,502	1,755	13,747	9,921	1,123	8,798	11,925	1,350	10,575	7,751	877	6,873
80	70	10,980	2,160	8,820	6,917	1,360	5,556	8,921	1,755	7,166	5,709	1,123	4,586	6,862	1,350	5,512	4,460	877	3,583
00	65	3,780	2,160	1,620	2,381	1,360	1,020	3,071	1,755	1,316	1,965	1,123	842	2,362	1,350	1,012	1,535	877	658
	60	2,160	2,160	0	1,360	1,360	0	1,755	1,755	0	1,123	1,123	0	1,350	1,350	0	877	877	0
	70	10,980	0	10,980	6,917	0	6,917	8,921	0	8,921	5,709	0	5,709	6,862	0	6,862	4,460	0	4,460
75	65	3,780	0	3,780	2,381	0	2,381	3,071	0	3,071	1,965	0	1,965	2,362	0	2,362	1,535	0	1,535
	60	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

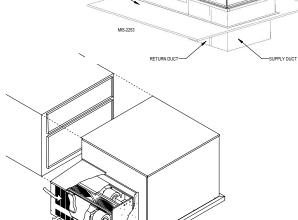
Winter Heating Performance
(Indoor Design Conditions 70°F DB)

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Ambient	VENTILATION RATE										
O.D.	400 CFM 75	5% Efficiency	325 CFM 76	6% Efficiency	250 CFM 77% Efficiency						
DB°F	WVL	WHR	WVL	WHR	WVL	WHR					
65	2,160	1,620	1,755	1,333	1,350	1,039					
60	4,320	3,240	3,510	2,667	2,700	2,079					
55	6,480	4,860	5,265	4,001	4,050	3,118					
50	8,640	6,480	7,020	5,335	5,400	4,158					
45	10,800	8,100	8,775	6,669	6,750	5,197					
40	12,960	9,720	10,530	8,002	8,100	6,237					
35	15,120	11,340	12,285	9,336	9,450	7,276					
30	17,280	12,960	14,040	10,670	10,800	8,316					
25	19,440	14,580	15,795	12,004	12,150	9,355					
20	21,600	16,200	17,550	13,338	13,500	10,395					
15	23,760	17,820	19,305	14,671	14,850	11,434					

Legend:

VLT = Ventilation Load - Total VLS = Ventilation Load - Sensible VLL = Ventilation Load - Latent HRT = Heat Recovery - Total HRS = Heat Recovery - Sensible

HRL = Heat Recovery - Latent WVL = Winter Ventilation Load WHR = Winter Heat Recovery



UNIT DIMENSIONS

Model	Width	Depth	Height	Shipping Weight
ERVR	* 32-3/4	18-3/4	18-3/4	125 lbs.

^{*} Does not include 1" mounting brackets on each side of ERVR.



Bard Manufacturing Company, Inc. Bryan, Ohio 43506 www.bardhvac.com

Due to our continuous product improvement policy, all specifications subject to change without notice.

Before purchasing this appliance, read important energy cost and efficiency information available from your retailer.

Form No. S3383 May, 2009

Supersedes: S3383-908